

WHAT IS CLAIMED IS:

1. A silica reinforced rubber composition which is comprised of (1) a rubbery polymer and (2) an elongated silica, wherein the elongated silica has a width that is within the range of about 5 nm to about 40 nm and wherein the elongated silica has a length of about 40 nm to about 300 nm.
2. A process for preparing a silica reinforced rubber composition which comprises (1) adding an elongated silica to a latex of a rubbery polymer, and (2) recovering the silica reinforced rubber composition from the latex.
3. A silica reinforced rubber composition as specified in claim 1 wherein the elongated silica is present at a level which is within the range of about 20 phr to about 70 phr.
4. A silica reinforced rubber composition as specified in claim 1 wherein the elongated silica is present at a level which is within the range of about 30 phr to about 60 phr.
5. A silica reinforced rubber composition as specified in claim 1 wherein the elongated silica is present at a level which is within the range of about 35 phr to about 55 phr.
6. A silica reinforced rubber composition as specified in claim 1 wherein the elongated silica has a length of about 70 nm to about 120 nm.
7. A silica reinforced rubber composition as specified in claim 1 wherein the elongated silica has a length of about 80 nm to about 100 nm.
8. A process as specified in claim 2 wherein the elongated silica is added in an amount which is within the range of about 20 phr to about 70 phr.

9. A process as specified in claim 2 wherein the elongated silica is added in an amount which is within the range of about 30 phr to about 60 phr.

5 10. A process specified in claim 2 wherein the elongated silica is added in an amount which is within the range of about 35 phr to about 55 phr.

10 11. A process as specified in claim 2 wherein the elongated silica has a width that is within the range of about 5 nm to about 40 nm and wherein the elongated silica has a length of about 40 nm to about 300 nm.

12. A process as specified in claim 2 wherein the elongated silica has a length of about 70 nm to about 120 nm.

15 13. A process as specified in claim 2 wherein the elongated silica has a length of about 80 nm to about 100 nm.

14. A process as specified in claim 2 wherein the rubbery polymer is a styrene-butadiene rubber.

20 15. A silica reinforced rubber composition as specified in claim 1 wherein the rubbery polymer is a styrene-butadiene rubber.